



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION III
1650 Arch Street
Philadelphia, Pennsylvania 19103-2029**

May 27, 2009

Mr. Kevin Wickey
State Conservationist
National Resources Conservation Service
75 High Street, Room 301
Morgantown, West Virginia 26505

Re: Draft Supplemental Work Plan No. 4 and Second Draft Environmental Impact Statement for the Lost River Subwatershed of the Potomac River Watershed, Hardy County, West Virginia
CEQ No. 20090107

Dear Mr. Wickey,

In accordance with the National Environmental Policy Act (NEPA) of 1969, Section 309 of the Clean Air Act and the Council on Environmental Quality regulations implementing NEPA (40 CFR 1500-1508), the U.S. Environmental Protection Agency (EPA) has reviewed Second Draft Environmental Impact Statement (DEIS) for the construction of the Site 16 flood control and water supply structure on Lower Cove Run, Lost River Subwatershed. The DEIS has been prepared and the project proposed by the Hardy County Commission, Potomac Valley Conservation District and the West Virginia State Conservation Committee; the document was prepared with assistance of the United States Department of Agriculture (USDA) Natural Resources Conservation Service.

This Second DEIS follows the DEIS for the Site 16 dam from the same sponsors submitted August 2006. After incorporation of responses to comments, a Final EIS (FEIS) was submitted in August 2007. A Record of Decision (ROD) was prepared and adopted shortly after the close of the review period in 2007 and an application was filed for a Clean Water Act Section 404 permit (for wetland fill and disturbance). It is our understanding that the ROD and application were withdrawn. A short discussion of the recent document history could be added to the 2009 Second DEIS. It is stated that this supplemental work plan is required because of the sponsor's request to change the purpose of the Site 16 and to modify the extent of the overall project by eliminating Site 23. These modifications were also included in the 2006 and 2007 EISs. The supplement states its purpose to update and reanalyze the EIS, reassess project feasibility and document changing conditions in the watershed.

The proposal of a series of five flood-control dams in the Lost River Watershed was made through a Work Plan and Final Environmental Impact Statement issued in October 1974. The

Work Plan was approved on February 11, 1975 under authority of the Flood Control Act, Public Law 534. The Work Plan has been supplemented three times in subsequent years to add sponsors, change the land treatment program and add rural water supply. Three structures have been constructed (Site 4, 27 and 10) of the original five proposed, and one has been dropped from consideration (Site 23). The Work Plan of March 2001 for Dam Site No. 10 (Parker Hollow) expanded its purpose to include rural water supply. To date the dam has not been fitted for permanent water withdrawal, though the impoundment has been used for emergency withdrawal. Evaluation was made of adapting the structure at Site 4 (Kimsey Run) for water supply, but it was determined that the reconstruction would be complicated, with high expense and impacts, though costs were less than construction of a new facility.

The 2009 document is enhanced by the updated information on aquatic resources, a more detailed analysis of cumulative impacts and the inclusion of additional information on minimization and proposed mitigation effort. The project as put forward in the Second DEIS is identical to that proposed in the early documents. The project will require 234.4 acres of land (refined from 231.5 acres in the FEIS 2007), and will inundate 46.6 acres (unchanged), and 40.2 acres of riparian and terrestrial habitat subjected to temporary inundation. Evaluation of impacts, particularly to aquatic resources has been refined since the 2007 document, showing wetland impact to be 16.02 acres (in contrast to the original estimate of 9.6 acres). Site 16 will permanently eliminate 0.58 miles (refined from 0.52 miles) of perennial stream, and 0.27 miles (unchanged from FEIS) of stream subject to temporary inundation by Site 16. The proposed project impacts a cold water stream with trout habitat (potentially identified as naturally reproducing).


The DEIS (2006) was rated by EPA as an EO-2 indicating that the agency objected to impacts to resources, and believed that the document gave inadequate support for the need of the project and inadequate review of alternatives for flood control and water supply. The numeric rating indicated a need for additional information, including current conditions in the project area. The FEIS did address some of issues, though concerns about the project remained.

The Second DEIS reviewed here is rated an EC-2, indicating environmental concerns and inadequate data. EPA maintains concerns because of environmental impacts to a cold water stream and loss of wetland resources, and inadequacies in information to support the project need (for instance, specific flood related damages in the area of the proposed structure) and current conditions of the study area (including current water quality on the reach where improvements are expected by the Site 16 project and data to evaluate and support that other dams that have been constructed as part of the watershed project have improved area conditions). The document lacks a substantial discussion of secondary impacts for a water distribution system (potentially considered a direct impact of the project as water supply is part of project purpose) and development suggested by the growth trends used to justify project need. Technical comments and a copy of the rating system used by EPA for Environmental Impact Statements are attached to this letter.



EPA appreciates the opportunity to review and comment on the Lost River project. If you have any questions regarding these comments, feel free to contact Ms. Barbara Rudnick, NEPA Team Leader at (215) 814-3322.

Sincerely,



Jeffrey Lapp
Associate Director
Office of Environmental Programs

Attachment

cc: US Army Corps of Engineers, Pittsburgh District



Technical Comments

1. Overall, the Second DEIS does not go far presenting information on the current condition of the watershed; since portions of the project (three of the dams) have been in place for several years, evaluation of current water quality or flooding issues specific to Site 16 study area would be appropriate. It remains of concern that the project is not analyzed independent of the combined effects of the other completed dams. Data that have been added to the appendices should be discussed in the text in more detail. Several of the following comments are associated with this concern.
2. A dual purpose and need of the project presents a problem for NEPA analysis, particularly when part of the project is not intended to be completed in the foreseeable future. (As is evident with Dam 10, though the impoundment is “required” for water supply, it has yet not been fitted for supply withdrawal). It is difficult to assess environmental impact of a water supply system for Site 16 when it is not certain what will be proposed. It also leaves open the potential to request evaluation of separate projects addressing needs, to determine if other alternatives could address need with less environmental impact.
3. It would be helpful if the text of the DEIS gave specific reference and explanation to figures and tables or charts in the appendices. For example, there are 30 pages of “pre-project acres flooded/with project flooded/ with project profile” in Appendix B, but a discussion of the data is not given. Maps showing the proposed water distribution system in Appendix B should be called out in the body of the EIS, referenced and described especially in regard to potential aquatic, woodland or social impacts. Maps depicting recent development in the County, also in Appendix B, should be given a specific reference in the text and discussed.
4. The document states that (page 31) about 43 square miles of drainage are controlled by Sites 4, 10 and 27 out of the 183 square miles of drainage in the Lost River Subwatershed. With construction of Site 16, an additional approximately 12 square miles of the Lost River Subwatershed will be located upstream of dam structures. The document discusses flood damages in terms of the watershed but does not refine damages specific to the area downstream of the proposed structure. This refinement would add substance to the purpose of presented in the EIS. As suggested for the earlier DEIS, it would be helpful to have a table to break down the flood event by year, number of structure suffering damage, value of losses (with references). The Second DEIS does not clearly present or evaluate the degree of flood protection the structure at Site 16 offers, (there is a limited discussion in Appendix C). If this is stated in the 1974 Work Plan, then current data would be beneficial. Information on what areas within the area of protection have specifically been affected by flooding in the last few decades since construction of the other dams in the watershed. Is there an estimate of the downstream affects of controlling water from the Lower Cove Run subwatershed?
5. Table 5 estimates average annual flood damage reduction benefits for the series of projects in the watershed (four structures). The methodology for deriving the table is not



discussed and should be included in the document. It is unclear what savings apply specifically to Site 16.

6. The document relies on the water supply needs presented in the Projected Water Needs in Hardy County, the same document from the earlier Draft and Final EIS (page 22 and Appendix E). It was evaluated and determined that the supply available at Site 10 (600,000 gallons per day, gpd, in drought conditions) alone will not meet the projected water demand of 800,000 gpd by Year 2020. The Hardy County document gives limited rationale for its estimate of demand, especially how the demand estimate factored in the expected growth of second homes, whose demand may be less than average home demand.
7. The report dismisses the use of wells, by stating that existing wells suffer supply challenges in times of drought, but provide no information on well depth, whether deeper wells have been developed and with what success.
8. The EIS gives a cursory analysis of alternatives. It would be useful for the document to include in an appendix the calculations made to determine wetland requirement for flood control (page 17).
9. It remains relevant and is recommended that historic water quality data be evaluated, and new data collected in order to determine the improvement achieved by the operation of the new dams that were constructed in the watershed over the last decades (Sites 4, 10, 27). This could be used to determine success of the projects, if changes in design or approach would be useful. It would be helpful to document and present specific sampling locations and indicator parameters for monitoring. It is our understanding that funds have not been made available in the past and are not proposed for water quality monitoring associated with these projects.
10. Protection of a cold water stream resource is an important goal of government agencies. EPA is pleased that the DEIS does discuss design features that will be included to address reducing the thermal impact of the dam. As this design has been used on other structures, it would be useful to be collecting thermal data to support that the design is effective. The data in Appendix D does provide some support of the design. Data for up and downstream would also be beneficial. It was our understanding that funds have not been set aside for thermal monitoring for the series of projects.
11. The Second DEIS states that an "aerial survey made in November 2004... documented 32,773 linear feet of severely eroded streambank along the main stem Lost River, as well as 6,801 linear feet impaired by bulldozer activity" (page 35). EPA is grateful that additional information was included to try to support project need. It is difficult to determine if the area that will be treated by the new structure is the area that is identified as being impaired, as the report is not specific in locating the area of impairment. Does chemical data in from the downstream sections of Lower Cove Run suggest impairment associated with erosion? Selection of an appropriate alternative would be better justified if water quality problems were identified using data specific to the area that will benefit from the proposed structure.
12. The Second DEIS does not fully evaluate or quantify secondary or indirect impacts of the proposal. This would include, as stated in our earlier comments, residential or commercial development associated with the proposed water supply system,



appurtenances of the system, thermal changes in the stream, fish passage issues, changes to hydrology that could affect remaining wetlands, invasive species. It is understood these changes may be long off, though it is uncomfortable and unfitting to have the impacts associated with a primary purpose of the project not be evaluated in the EIS. It could be argued that the water distribution system is a direct impact of a connected action; this would include the impacts of construction of the line and associated facilities (such as pump stations or treatment) and should be evaluated in a single document.

13. The Second DEIS has expanded and improved the cumulative impacts analysis. The analysis does not incorporate a baseline as described in CEQ guidance. A baseline is used to compare present and predicted future condition of resources (selecting resources that will be impacted by the project). Specific values for amount of resources, for instance acres of forest, wetlands, etc should be quantified for the past, present and likely future to determine trend and significance of losses. Elements of the water distribution system associated with Dam 16 are a direct impact of the purpose of the project, and should be evaluated as direct or minimally secondary impact (not cumulative).
14. The cumulative impact analysis should point out that though resources such as forest or wetland can have proposed mitigation, the function of the created resource can often be delayed in time by many years.
15. Mitigation of unavoidable impacts is essential to the project and is an important addition to the new document. The conceptual mitigation proposed should be further developed for the FEIS, including ratios, maps and conceptual design for wetlands, streams and forest. The DEIS states (page 104) 3,040 linear feet of Lower Cove Run will be eliminated and references Table 1; it is not evident that Table 1 includes any relevant information to Site 16. Alternatives analysis, documentation and acceptable mitigation for the Section 404 application will be addressed during the application process. Is there a proposal to replace loss of woodland by the project?

The document has been reviewed for Environmental Justice (EJ) issues with the following comments submitted for consideration:

1. The Second DEIS does not provide the background material to document the procedure used to identify areas of potential EJ concern. Information related to the make-up of the community impacted by and in close proximity of the project is not provided. Generally demographic information and economic information such as poverty level data or low-income status for the area affected by the project is compared to a state/or local benchmark. The County information is presented in the Summary; information for the project area is not specified. If Hardy County is being used as the "project area" and is being compared to the State, it is not clear in the analysis and may not be appropriate to the specific area affected by the project. How was a lack of disproportionate impact assessed?
2. The extent of community involvement in the planning and decision making process is not included in the discussion of EJ. This typically includes report of strategies used to assure the appropriate participation of impacted residents.



RATING THE ENVIRONMENTAL IMPACT OF THE ACTION

- **LO (Lack of Objections)** The review has not identified any potential environmental impacts requiring substantive changes to the preferred alternative. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposed action.
- **EC (Environmental Concerns)** The review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce the environmental impact.
- **EO (Environmental Objections)** The review has identified significant environmental impacts that should be avoided in order to adequately protect the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no action alternative or a new alternative). The basis for environmental Objections can include situations:
 1. *Where an action might violate or be inconsistent with achievement or maintenance of a national environmental standard;*
 2. *Where the Federal agency violates its own substantive environmental requirements that relate to EPA's areas of jurisdiction or expertise;*
 3. *Where there is a violation of an EPA policy declaration;*
 4. *Where there are no applicable standards or where applicable standards will not be violated but there is potential for significant environmental degradation that could be corrected by project modification or other feasible alternatives; or*
 5. *Where proceeding with the proposed action would set a precedent for future actions that collectively could result in significant environmental impacts.*
- **EU (Environmentally Unsatisfactory)** The review has identified adverse environmental impacts that are of sufficient magnitude that EPA believes the proposed action must not proceed as proposed. The basis for an environmentally unsatisfactory determination consists of identification of environmentally objectionable impacts as defined above and one or more of the following conditions:
 1. *The potential violation of or inconsistency with a national environmental standard is substantive and/or will occur on a long-term basis;*
 2. *There are no applicable standards but the severity, duration, or geographical scope of the impacts associated with the proposed action warrant special attention; or*
 3. *The potential environmental impacts resulting from the proposed action are of national importance because of the threat to national environmental resources or to environmental policies.*

RATING THE ADEQUACY OF THE DRAFT ENVIRONMENTAL IMPACT STATEMENT (EIS)

- **1 (Adequate)** The draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis or data collection is necessary, but the reviewer may suggest the addition of clarifying language or information.
- **2 (Insufficient Information)** The draft EIS does not contain sufficient information to fully assess environmental impacts that should be avoided in order to fully protect the environment, or the reviewer has identified new reasonably available alternatives that are within the spectrum of alternatives analyzed in the draft EIS, which could reduce the environmental impacts of the proposal. The identified additional information, data, analyses, or discussion should be included in the final EIS.
- **3 (Inadequate)** The draft EIS does not adequately assess the potentially significant environmental impacts of the proposal, or the reviewer has identified new, reasonably available, alternatives, that are outside of the spectrum of alternatives analyzed in the draft EIS, which should be analyzed in order to reduce the potentially significant

environmental impacts. The identified additional information, data, analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. This rating indicates EPA's belief that the draft EIS does not meet the purposes of NEPA and/or the Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS.